Appl. No. 10/072,415 Amdt. dated 04/15/2005 Response to Office Action mailed 12/15/2004

In the Claims

Claims 1-73 are canceled.

74. [Previously Presented] A field effect transistor fabrication method comprising: providing semiconductive material including a channel region;

providing a source semiconductive region and a drain semiconductive region adjacent to the channel region of the semiconductive material, and wherein the providing the drain semiconductive region comprises providing at least one emitter;

providing gate dielectric material over the channel region; and providing a gate over the gate dielectric material and the channel region.

- 75. [Previously Presented] The method of claim 74 wherein the providing the semiconductive material comprises providing a thin film semiconductive layer.
- 76. [Previously Presented] The method of claim 74 wherein the providing the gate comprises polishing the gate dielectric material and gate material to form the gate aligned with the channel region of the semiconductive material.
- 77. [Previously Presented] The method of claim 74 wherein the providing the at least one emitter comprises providing a plurality of emitters.

- 78. [Previously Presented] The method of claim 74 wherein the providing the gate comprises providing the gate about the emitter.
 - 79. [Previously Presented] A field effect transistor fabrication method comprising: providing semiconductive material including a channel region;

providing a plurality of semiconductive regions adjacent to the channel region of the semiconductive material; and

self-aligning a gate with the semiconductive regions after the providing the semiconductive regions.

- 80. [Previously Presented] The method of claim 79 wherein the providing the semiconductive material comprises providing a thin film semiconductive layer.
 - 81. [Previously Presented] The method of claim 79 further comprising: providing gate dielectric material over the channel region; and providing gate material over the gate dielectric material;

wherein the self-aligning comprises polishing the gate dielectric material and the gate material.

82. [Previously Presented] The method of claim 79 further comprising providing gate dielectric material over the channel region and the gate dielectric material including an upper surface substantially elevationally coincident with an upper surface of the gate.

83. [Previously Presented] A field emission device fabrication method comprising:

providing semiconductive material;

providing a plurality of semiconductive regions adjacent to the semiconductive material, and wherein the providing the semiconductive regions comprises providing one of the semiconductive regions comprising an emitter; and

providing a gate intermediate the semiconductive regions.

- 84. [Previously Presented] The method of claim 83 wherein the providing the semiconductive material comprises providing a thin film semiconductive layer.
- 85. [Previously Presented] The method of claim 83 wherein the providing the semiconductive regions and the providing the gate comprise forming a field effect transistor.

86. [Previously Presented] The method of claim 83 wherein the providing one of the semiconductive regions comprising an emitter comprises forming a tip of the emitter elevationally below an upper surface of the gate and an upper surface of another one of

the semiconductive regions.

87. [Previously Presented] The method of claim 83 wherein the providing one

of the semiconductive regions comprising an emitter comprises providing a plurality of

emitters.

88. [Previously Presented] The method of claim 83 wherein the providing the

gate comprises providing the gate about the emitter.

89. [Previously Presented] A field emission device operational method

comprising:

providing a plurality of semiconductive regions adjacent to a channel region, and

wherein at least one of the semiconductive regions comprises an emitter; and

controlling current flow intermediate the semiconductive regions within the channel

region and controlling emission of electrons from the field emitter using a gate intermediate

the semiconductive regions.

5

90. [Previously Presented] The method of claim 89 wherein the providing the semiconductive regions comprises providing the semiconductive regions adjacent to semiconductive material comprising a semiconductive layer.

91. [Previously Presented] The method of claim 89 wherein the providing the semiconductive regions comprises providing the semiconductive regions adjacent to semiconductive material comprising a thin film semiconductive layer.

92. [Previously Presented] The method of claim 89 further comprising configuring the gate and the semiconductive regions to form a field effect transistor.

93. [Previously Presented] A field effect transistor fabrication method comprising: providing spaced semiconductive regions;

providing a channel region within semiconductive material between the spaced semiconductive regions;

providing gate dielectric material over the channel region; and

providing a gate intermediate the semiconductive regions and over the channel region;

wherein the gate dielectric layer has an upper surface elevationally coincident with an upper surface of the gate.

- 94. [Previously Presented] The method of claim 93 further comprising providing the semiconductive material comprising a thin film conductive layer.
- 95. [Previously Presented] The method of claim 93 wherein the semiconductive regions comprise an upper surface substantially elevationally coincident with an upper surface of the gate.
- 96. [Previously Presented] The method of claim 93 wherein the providing the gate comprises polishing gate material and the gate dielectric material.
 - 97. [Previously Presented] A field effect transistor fabrication method comprising: providing a plurality of semiconductive regions with a channel region therebetween; providing a gate dielectric layer over the channel region; and providing a gate over the gate dielectric layer;

wherein the providing the gate comprises aligning the gate with the channel region using the gate dielectric layer.

98. [Previously Presented] The method of claim 97 further comprising providing semiconductive material comprising the channel region.

99. [Previously Presented] The method of claim 98 wherein the providing the semiconductive material comprises providing a thin film semiconductive layer.

100. [Previously Presented] The method of claim 97 wherein the providing the gate comprises forming a gate layer over the gate dielectric layer, and the aligning comprises removing portions of the gate dielectric layer and the gate layer.

101. [Previously Presented] The method of claim 97 wherein the providing the semiconductive regions comprises providing at least one of the semiconductive regions comprising a field emitter.

102. [Previously Presented] A field effect transistor fabrication method comprising: providing semiconductive material including a channel region;

providing a plurality of semiconductive regions adjacent to the channel region of the semiconductive material; and

providing a gate comprising gate material over the channel region of the semiconductive material without the use of a mask over the gate material.

103. [Previously Presented] The method of claim 102 wherein the providing the semiconductive material comprises providing a thin film semiconductive layer.

Appl. No. 10/072,415

Amdt. dated 04/15/2005

Response to Office Action mailed 12/15/2004

104. [Previously Presented] The method of claim 102 further comprising providing

gate dielectric material over the semiconductive material, and wherein the providing the

gate comprises aligning the gate with the channel region of the semiconductive material

using gate dielectric material.

105. [Previously Presented] The method of claim 102 wherein the providing the

gate comprises removing portions of the gate material to self-align the gate with the

channel region of the semiconductive material.

106. [Previously Presented] The method of claim 102 further comprising providing:

gate dielectric material over the semiconductive material, and wherein an upper surface

of the gate dielectric material is substantially elevationally coincident with an upper surface

of the gate.

107. [Previously Presented] The method of claim 102 wherein the providing the

semiconductive regions comprises providing a drain region comprising a field emitter.

108. [Previously Presented] A field effect transistor fabrication method comprising:

providing spaced semiconductive regions including a channel region positioned

therebetween;

9

providing gate material and gate dielectric material over the channel region; and polishing the gate dielectric material and the gate material to form a gate intermediate the spaced semiconductive regions over the channel region.

- 109. [Previously Presented] The method of claim 108 wherein the polishing aligns the gate with the channel region.
- 110. [Previously Presented] The method of claim 108 wherein the providing the semiconductive regions comprises providing a drain comprising a field emitter.
- 111. [Previously Presented] The method of claim 108 wherein the polishing comprises chemical-mechanical polishing.
- 112. [New] The method of claim 74 wherein the providing the drain semiconductive region and the providing the at least one emitter comprise forming the drain semiconductive region and the at least one emitter to comprise a monolithic semiconductive material.
- 113. [New] The method of claim 74 wherein the providing the drain semiconductive region and the providing the at least one emitter comprise etching.

Appl. No. 10/072,415 Amdt. dated 04/15/2005 Response to Office Action mailed 12/15/2004

- 114. [New] The method of claim 83 wherein the providing the one of the semiconductive regions comprising an emitter comprises etching.
- 115. [New] The method of claim 89 wherein the providing the at least one of the semiconductive regions comprising an emitter comprises etching to form the at least one semiconductive region and the emitter.